03050109-160
(Little River)

General Description

Watershed 03050109-160 is located in Laurens and Newberry Counties and consists primarily of the *Little River* and its tributaries. The watershed occupies 147,032 acres of the Piedmont region of South Carolina. The predominant soil types consist of an association of the Cecil-Pacolet-Madison-Herndon series. The erodibility of the soil (K) averages 0.28; the slope of the terrain averages 15%, with a range of 2-40%. Land use/land cover in the watershed includes: 5.22% urban land, 14.25% agricultural land, 5.26% scrub/shrub land, 0.81% barren land, 74.36% forested land, and 0.10% water.

Reedy Fork Creek flows into the Little River in the City of Laurens, and Burnt Mill Creek (Scout Branch) enters the river further downstream. North Creek, Beaverdam Creek, and Simmons Creek drain into Little River next followed by Garrison Creek, Sandy Run Creek (Reeder Branch), Mechanic Creek, Mudlick Creek (Campbell Creek, North Campbell Creek, Mill Creek, Watkins Creek, Mills Creek, Pages Creek), Davenport Branch, Stephens Creek, and Turners Branch. There are a total of 190.8 stream miles in this watershed, all classified FW. Several small lakes are located in the watershed for recreation, and a large pond (150 acres) is located on Beaverdam Creek for flood control.

Water Quality

Station #	Type	Class	Description
S-034	P	FW	LITTLE RIVER AT US BUSINESS 76, IN LAURENS ABOVE WWTP
S-297	S	FW	LITTLE RIVER AT SC ROUTE 127
S-135	S	FW	NORTH CREEK AT US 76, 2.8 MI W OF CLINTON
S-038	W	FW	LITTLE RIVER AT SC 560
S-100	BIO	FW	LITTLE RIVER AT SR 48
S-099	S	FW	LITTLE RIVER AT S-36-22, 8.3 MI NW SILVERSTREET
S-305	W	FW	LITTLE RIVER AT SC 34

***Little River* - There are six monitoring sites along the Little River, which was Class B until April, 1992. At the furthest upstream site (S-034), aquatic life uses are fully supported, but there is a significant increasing trend in turbidity and a high concentration of zinc measured in 1993. Significant decreasing trends in five-day biochemical oxygen demand and total phosphorus and total nitrogen concentrations suggest improving conditions for these parameters. Further downstream (S-297), aquatic life uses are again fully supported, but there is a significant decreasing trend in pH. A significant increasing trend in dissolved oxygen concentration and significant decreasing trends in five-day biochemical oxygen demand and total phosphorus concentrations suggest improving conditions for these parameters. Recreational uses are not supported at either upstream site due to fecal coliform bacteria excursions.**

At the next site downstream (S-038), aquatic life uses are fully supported, but there was a very high concentration of chromium measured in 1997. Recreational uses are partially supported due to fecal coliform bacteria excursions. Aquatic life uses are fully supported further downstream (S-100) based on macroinvertebrate community data. At the next station downstream (S-099), aquatic life uses are again fully supported, and significant decreasing trend in total phosphorus concentrations suggests improving conditions for these parameters. Recreational uses are not supported due to fecal coliform bacteria excursions, compounded by a significant increasing trend in fecal coliform bacteria. At the furthest downstream site (S-305), aquatic life uses are fully supported, but recreational uses are not supported due to fecal coliform bacteria excursions.

North Creek (S-135) **- This stream was Class B until April, 1992. Aquatic life uses are fully supported, but there is a significant decreasing trend in pH. A significant increasing trend in dissolved oxygen concentration and significant decreasing trends in five-day biochemical oxygen demand, total phosphorus concentrations, and turbidity suggest improving conditions for these parameters. Recreational uses are not supported due to fecal coliform bacteria excursions, compounded by a significant increasing trend in fecal coliform bacteria.**

Permitted Activities

Point Source Contributions

RECEIVING STREAM *FACILITY NAME* *PERMITTED FLOW @ PIPE (MGD)* *COMMENT*	*NPDES#* *TYPE* *LIMITATION*
LITTLE RIVER **CITY OF LAURENS** **PIPE #: 001 FLOW: 4.500** **WQL FOR NH3-N, DO, TRC, BOD5**	**SC0020702** **MAJOR MUNICIPAL** **WATER QUALITY**
LITTLE RIVER **WR GRACE & CO./CRAIG MINE** **PIPE #: 001 FLOW: M/R**	**SCG730003** **MINOR INDUSTRIAL** **EFFLUENT**
LITTLE RIVER **WR GRACE & CO./HUDGENS MINE** **PIPE #: 001 FLOW: M/R**	**SCG730030** **MINOR INDUSTRIAL** **EFFLUENT**
DITCH TO LITTLE RIVER **CHAMPION INTL. CORP.** **PIPE #: 001 FLOW: 0.239**	**SC0022730** **MINOR INDUSTRIAL** **EFFLUENT**
LITTLE RIVER TRIBUTARY **JPS CONVERTER & INDUSTRIES/WATTS** **PIPE #: 001 FLOW: .0003**	**SCG250011** **MINOR INDUSTRIAL** **EFFLUENT**
LITTLE RIVER TRIBUTARY **WR GRACE & CO./HICKORY MINE** **PIPE #: 001 FLOW: M/R**	**SCG730002** **MINOR INDUSTRIAL** **EFFLUENT**
LITTLE RIVER TRIBUTARY **WR GRACE & CO./STRIBLING MINE** **PIPE #: 001 FLOW: M/R**	**SCG730087** **MINOR INDUSTRIAL** **EFFLUENT**
SPRAYFIELD TO TURNER BRANCH **ISE NEWBERRY, INC.** **PIPE #: 001 FLOW:** **WQL FOR BOD5, NH3-N**	**SC0047686** **MINOR INDUSTRIAL** **WATER QUALITY**
REEDY FORK CREEK **CITY OF LAURENS/WTP** **PIPE #: 001 FLOW: 0.03** **WQL FOR TRC**	**SCG645006** **MINOR DOMESTIC** **WATER QUALITY**
BURNT MILL CREEK	**SC0041742**

INDUSTRIAL METAL PROCESSING **PIPE #: 001 FLOW: M/R**	**MINOR INDUSTRIAL** **EFFLUENT**
BURNT MILL CREEK **WR GRACE & CO./TRISTAN MINE** **PIPE #: 001 FLOW: M/R**	**SCG730031** **MINOR INDUSTRIAL** **EFFLUENT**

LAND APPLICATION FACILITY NAME	**PERMIT# TYPE**
SPRAYFIELD **DOUBLE M FARMS**	**ND0078191** **DOMESTIC**

Landfill Activities

SOLID WASTE LANDFILL NAME ***FACILITY TYPE***	***PERMIT #*** ***STATUS***
ALSIMAG (GE CERAMICS) **INDUSTRIAL**	**-------** **CLOSED**
LAURENS COUNTY **MUNICIPAL**	**------** **CLOSED**

Mining Activities

MINING COMPANY ***MINE NAME***	***PERMIT #*** ***MINERAL***
WR GRACE & CO. **TRISTON MINE**	**0750-30** **VERMICULITE**
WR GRACE & CO. **HUDGING MINE**	**0749-30** **VERMICULITE**
WR GRACE & CO. **LEONARD MINE**	**0835-30** **VERMICULITE**
WR GRACE & CO. **STRIBLING MINE**	**1117-30** **VERMICULITE**
WR GRACE & CO. **MIMS MINE**	**1020-30** **VERMICULITE**
CAROLINA VERMICULITE COMPANY, INC. **KENNETH HANNA MINE**	**0642-30** **VERMICULITE**
CAROLINA VERMICULITE COMPANY, INC. **WL PATTERSON MINE**	**1130-30** **VERMICULITE**
CAROLINA VERMICULITE COMPANY, INC. **VERENES TRACT**	**1111-30** **VERMICULITE**
SOUTHERN BRICK COMPANY **SPIGNER MINE**	**0828-36** **CLAY**

Groundwater Concerns

The groundwater in the vicinity of the landfill and surface impoundments owned by Alsimag (GE

Ceramics) is contaminated with volatile organics. The facility is in the assessment phase, and remediation options are being evaluated for plant two area. The surface water affected by the groundwater contamination is an unnamed tributary to Reedy Fork Creek.

Water Supply

WATER USER (TYPE)	*REGULATED CAPACITY (MGD)*
WATERBODY	*PUMPING CAPACITY (MGD)*
CITY OF LAURENS CPW (M)	1.5
REEDY FORK CREEK	3.5

Growth Potential

The City of Laurens is located in the northern portion of this watershed and has a high potential for growth. Factors that influence this growth include two major rail lines, US 221, US 76, and I-385. The Laurens County Industrial Park is a growth area in the predominately rural southern portion of the watershed.